

Title (en)
ALUMINUM ALLOY WIRE

Title (de)
ALUMINIUMLEGIERUNGSDRAHT

Title (fr)
FIL EN ALLIAGE D'ALUMINIUM

Publication
EP 2381001 A4 20130102 (EN)

Application
EP 10731340 A 20100119

Priority
• JP 2010050577 W 20100119
• JP 2009009370 A 20090119

Abstract (en)
[origin: EP2381001A1] Disclosed is an aluminum alloy wire which has an alloy composition that contains 0.1-0.4 mass% of Fe, 0.1-0.3 mass% of Cu, 0.02-0.2 mass% of Mg and 0.02-0.2 mass% of Si, while containing 0.001-0.01 mass% of Ti and V in total, with the balance made up of Al and unavoidable impurities. The aluminum alloy wire has a crystal grain size of 5-25 μm in a vertical cross-section in the drawing direction of the wire, a tensile strength (TS) of not less than 80 MPa and an elongation (EI) of not less than 15% in accordance with JIS Z 2241, and an electrical conductivity of not less than 55% IACS. The 0.2% proof stress (YS, MPa) of the aluminum alloy wire in accordance with JIS Z 2241 and the above-described TS satisfy the relation represented by the following formula: $1.5 \leq \text{TS} / \text{YS} \leq 3$.

IPC 8 full level
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CPC (source: EP US)
C22C 21/00 (2013.01 - EP US); **C22C 21/14** (2013.01 - EP US); **C22C 21/16** (2013.01 - EP US); **H01B 1/023** (2013.01 - EP US)

Citation (search report)
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• See references of WO 2010082671A1

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